National Environmental Satellite, Data, and Information Service
Satellite Command & Control

Satellite Command & Control Operations

Satellite Command and Data Acquisition Antenna

NOAA Polar-orbiting Satellite

The National Requirement: The Nation requires an environmental satellite system capable of providing timely and accurate environmental data. NESDIS satellites provide 85 percent of the data used by the National Weather Service for forecasting activities. Early warning of major weather events saves countless lives and prevents substantial property damage. The health and safety of these satellites is essential to preventing severe loss of life and property caused by extreme environmental events.

NOAA's Response: The NESDIS Satellite Command and Control program operates, monitors, maintains, and acquires data from NOAA polar-orbiting and geostationary satellites as well as Department of Defense and other operational and research Earth-observing satellites. The Satellite Command and Control program provides the day-to-day operations of the NOAA Satellite Operations Control Center in Suitland, Maryland, and satellite Command and Data Acquisition ground stations in Wallops, Virginia, and in Fairbanks, Alaska. Together, these activities form the backbone of the ground systems that support NOAA spacecraft programs - commanding, controlling, and acquiring data from on orbit satellites with an estimated value of $4.5 billion on a 24 hours per day, 365 days per year basis.

Financing: The FY 2003 Budget includes $37.1 million for the NESDIS Satellite Command and Control program, which includes a program increase of $2.5 million. NOAA will use $2.2 million to support the Satellite Command and Data Acquisition (CDA) in Fairbanks, Alaska. In FY 2002, NOAA extended the Fairbanks CDA operation contract for six months, at a one-time cost of $2.8 million, in preparation for recompetition, which will take place in FY 2003. In FY 2003, the award of the new contract will require twelve full months of funding in order for the Station to operate.

Since the Fairbanks station tracks and acquires data from NOAA Polar-orbiting Operational Environmental Satellites and the Defense Meteorological Satellites, information provided by these satellites could become unavailable without the requested funding. This will seriously impact the delivery of satellite data to the National Weather Service, setting forecast skill levels back several years. The loss of polar satellite information would also significantly impact the military, which relies on critical imagery and other satellite information to determine environmental conditions in areas where military operations are occurring.

NESDIS will also enhance security at its satellite CDA stations to reduce the risk to satellite and ground systems assets due to breaches in security. Billions of dollars in damage and hundreds of lives are lost each year due to natural disasters. These losses would be worse if NOAA satellite data and services were unavailable due to interference with critical satellite command and data acquisition infrastructure.